- (a5) adding Freund's adjuvant equal to total volume of said streptococcus mutans type c and type d with high speed homogenized;
- (b) immunizing hens with said streptococcus mutans antigen to obtain eggs with active antibody from said hens;
 - (c) extracting a crude IgY from said eggs by water dilution method;
- (d) applying said crude IgY on "DEAE-Sephadex A50" column and eluting with phosphate buffer containing 0.07M of NaCl to obtain eluates of protein peak;
- (e) applying said eluates of protein peak on Sephadex G200 column and eluting with phosphate buffer containing 0.1M of NaCl to obtain new eluates of protein peak;
 - (f) collecting said new eluates of protein peak;
- (g) estimating antibody activity of said eluates of protein peaks with "ELISA"; and
- (h) eliminating bacteria by 0.22µm membrane filtration and lyophilizing to achieve a purified IgY against dental caries bacteria.

